



DOCKET NO.: T0529.70004US00

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

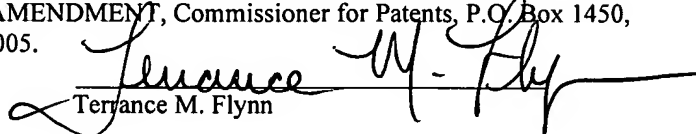
Applicant: Muhammad Akbar Khan Afzal  
Serial No.: 10/672,821  
Confirmation No.: 8929  
Filed: September 26, 2003  
For: METHOD AND APPARATUS FOR IDENTIFYING  
FAULTS IN A BROADBAND NETWORK

Examiner: Mohammed H. Ghayour  
Art Unit: 2631

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**CERTIFICATE OF MAILING UNDER 37 C.F.R. §1.8(a)**

The undersigned hereby certifies that this document is being placed in the United States mail with first-class postage attached, addressed to MAIL STOP AMENDMENT, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450, on the 28th day of July, 2005.

  
Terrance M. Flynn

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**MAIL STOP AMENDMENT**

Commissioner For Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

Sir:

Transmitted herewith are the following documents:

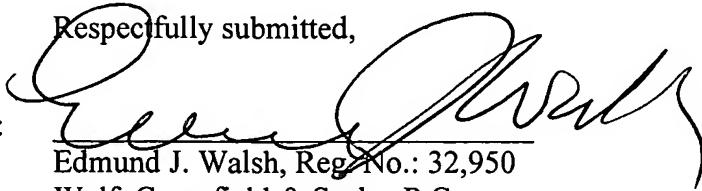
- Information Disclosure Statement
- PTO Form 1449 with cited references
- Return Receipt Postcard

If the enclosed papers are considered incomplete, the Mail Room and/or the Application Branch is respectfully requested to contact the undersigned at (617) 646-8000, Boston, Massachusetts.

A check is not enclosed. If a fee is required, the Commissioner is hereby authorized to charge Deposit Account No. 23/2825. A duplicate of this sheet is enclosed.

Respectfully submitted,

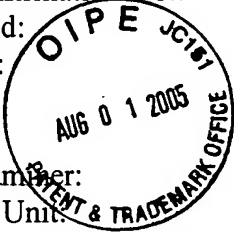
By:

  
Edmund J. Walsh, Reg. No.: 32,950  
Wolf, Greenfield & Sacks, P.C.  
600 Atlantic Avenue  
Boston, Massachusetts 02210-2206  
Telephone: (617) 646-8000

Docket No.: T0529.70004US00  
Date: July 28, 2005  
xNDDx

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Terrance M. Flynn

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**MAIL STOP AMENDMENT**

Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

STATEMENT FILED PURSUANT TO THE DUTY OF  
DISCLOSURE UNDER 37 CFR §§1.56, 1.97 AND 1.98

Sir:

Pursuant to the duty of disclosure under 37 C.F.R. §§1.56, 1.97 and 1.98, the Applicant requests consideration of this Information Disclosure Statement.

PART I: Compliance with 37 C.F.R. §1.97

This Information Disclosure Statement has been filed before the mailing date of a first Office Action on the merits in the above-identified case.

No fee or certification is required.

PART II: Information Cited

The Applicant hereby makes of record in the above-identified application the information listed on the attached form PTO-1449 (modified). The order of presentation of the references should not be construed as an indication of the importance of the references.

The Applicant hereby makes the following additional information of record in the above-identified application.

The Applicant would like to bring to the Examiner's attention the following co-pending applications and commonly owned patents that may contain subject matter related to this application:

<u>Patent No.</u>	<u>Issue Date or Filing Date</u>	<u>Inventor(s)</u>
6,826,258	November 30, 2004	Afzal
6,741,676	May 25, 2004	Rudinsky et al
6,687,336	February 3, 2004	Holeys
6,513,025	January 28, 2003	Rosen
6,487,276	November 26, 2002	Rosen et al
6,389,109	May 14, 2002	Schmidt et al
6,385,297	May 7, 2002	Faulkner et al
5,881,130	March 9, 1999	Zhang
11/060,904	February 18, 2005	Schmidt et al
11/007,970	December 9, 2004	Faulkner
11/005,055	December 6, 2004	Faulkner
10/399,641	July 30, 2003	Bauer
10/236,128	January 9, 2003	Rosen et al
10/220,716	November 26, 2002	Faulkner et al
10/260,950	September 30, 2002	Holeva
10/199,589	December 20, 2001	Faulkner
10/332,777	July 16, 2001	Faulkner
09/692,169	October 19, 2000	Rosen
09/294,563	April 20, 1999	Schmidt et al.

### PART III: Remarks

Documents cited anywhere in the Information Disclosure Statement are enclosed unless otherwise indicated. It is respectfully requested that:

1. The Examiner consider completely the cited information, along with any other information, in reaching a determination concerning the patentability of the present claims;
2. The enclosed form PTO-1449 be signed by the Examiner to evidence that the cited information has been fully considered by the Patent and Trademark Office during the examination of this application;
3. The citations for the information be printed on any patent which issues from this application.

4. Applicant is unable to locate copies of some of the non-patent documents. All documents were previously submitted in at least one related application.

By submitting this Information Disclosure Statement, the Applicant makes no representation that a search has been performed, of the extent of any search performed, or that more relevant information does not exist.

By submitting this Information Disclosure Statement, the Applicant makes no representation that the information cited in the Statement is, or is considered to be, material to patentability as defined in 37 C.F.R. §1.56(b).

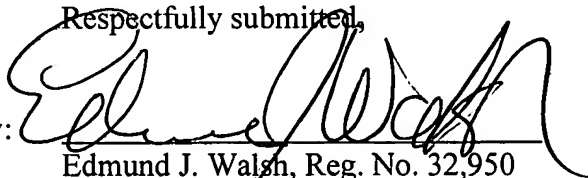
By submitting this Information Disclosure Statement, the Applicant makes no representation that the information cited in the Statement is, or is considered to be, in fact, prior art as defined by 35 U.S.C. §102.

Notwithstanding any statements by the Applicant, the Examiner is urged to form his own conclusion regarding the relevance of the cited information.

An early and favorable action is hereby requested.

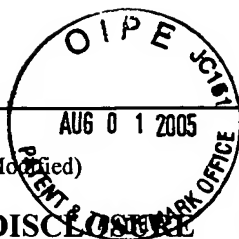
Respectfully submitted,

By:



Edmund J. Walsh, Reg. No. 32,950  
Wolf, Greenfield & Sacks, P.C.  
600 Atlantic Avenue  
Boston, Massachusetts 02210-2206  
Telephone: (617) 646-8000

Docket No.: T0529.70004US00  
Date: July 28, 2005  
**xNDDx**



FORM PTO-1449/A and B (Modified)

**INFORMATION DISCLOSURE  
STATEMENT BY APPLICANT**

APPLICATION NO.: 10/672,821

ATTY. DOCKET NO.: T0529.70004US00

FILING DATE: 9/26/03

CONFIRMATION NO.: 8929

APPLICANT: Muhammad Akbar Khan Afzal

GROUP ART UNIT: 2631

EXAMINER: Mohammed H. Ghayour

Sheet 1 of 4

**U.S. PATENT DOCUMENTS**

Examiner's Initials	Cite No.	U.S. Patent Document		Name of Patentee or Applicant of Cited Document	Date of Publication or of issue of Cited Document MM-DD-YYYY
		Number	Kind Code		
		3,882,287		Simmonds	05/06/1975
		4,087,657		Peoples	05/02/1978
		4,186,283		Simmonds	01/29/1980
		4,620,069		Godwin et al	10/28/1986
		4,529,847		DeBalko	07/16/1985
		4,868,506		DiStefano	09/19/1989
		5,025,221		Blaess	06/18/1991
		5,083,086		Steiner	01/21/1992
		5,121,420		Marr, et al.	06/09/1992
		5,128,619		Bjork, et al.	07/07/1992
		5,157,336		Crick	10/20/1992
		5,270,661		Burnett	12/14/1993
		5,302,905		Crick	04/12/1994
		5,319,311		Kawashima, et al.	06/07/1994
		5,400,321		Nagato	03/21/1995
		5,402,073		Ross	03/28/1995
		5,404,388		Eu	04/04/1995
		5,436,953		Nilson	07/25/1995
		5,461,318		Borchert et al.	10/24/1995
		5,465,287		Egozi	11/07/1995
		5,528,661		Siu et al	06/18/1996
		5,528,679		Taarud	06/18/1996
		5,606,592		Galloway, et al.	02/25/1997
		5,629,628		Hinds et al	05/13/1997
		5,636,202		Garney	06/03/1997
		5,680,391		Barron et al	10/21/1997
		5,699,402		Bauer et al	12/16/1997
		5,758,027		Meyers et al	05/26/1998
		5,790,523		Ritchie, Jr. et al.	08/04/1998
		5,864,602		Needle	01/26/1999
		5,870,451		Winkler, et al.	02/09/1999
		5,881,130		Zhang	03/09/1999

EXAMINER:

DATE CONSIDERED:

FORM PTO-1449/A and B (Modified)  <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>				APPLICATION NO.: 10/672,821		ATTY. DOCKET NO.: T0529.70004US00	
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				GROUP ART UNIT: 2631		EXAMINER: Mohammed H. Ghayour	
Sheet	2	of	4				

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Examiner's Initials	Cite No.	U.S. Patent Document		Name of Patentee or Applicant of Cited Document	Date of Publication or of issue of Cited Document MM-DD-YYYY
		Number	Kind Code		
		5,937,033		Bellows	08/10/1999
		5,956,386		Miller	09/21/1999
		5,978,449		Needle	11/02/1999
		6,002,671		Kahkoska et al	12/14/1999
		6,014,425		Bingel et al	01/11/2000
		6,026,145		Bauer et al	02/15/2000
		6,084,946		Beierle	07/04/2000
		6,091,338		Natra	07/18/2000
		6,091,713		Lechleider et al	07/18/2000
		6,107,867		Lakshmikumar	08/22/2000
		6,111,861		Burgess	08/29/2000
		6,115,466		Bella	09/05/2000
		6,118,860		Hillson et al	09/12/2000
		6,154,447		Vedder	09/10/1997
		6,169,785		Okazaki	01/02/2001
		6,177,801		Chong et al	01/23/2001
		6,181,775		Bella	01/30/2001
		6,192,109		Amrany et al	02/20/2001
		6,205,202		Yoshida et al	03/20/2001
		6,209,108		Pett et al	03/27/2001
		6,215,854		Walance	04/10/2001
		6,215,855		Schneider	04/10/2001
		6,226,356		Brown	05/01/2001
		6,240,177		Guntzburger et al.	05/29/2001
		6,256,377		Murphree et al.	07/03/2001
		6,263,047		Randle et al.	07/17/2001
		6,263,048		Nelson et al.	07/17/2001
		6,266,395		Liu et al	07/24/2001
		6,285,653		Koeman et al.	09/04/2001
		6,292,468		Sanderson	09/18/2001
		6,292,539		Eichen et al	09/18/2001
		6,349,130		Posthuma et al	02/19/1992
		6,366,644		Sisk et al	02/02/2002
		6,385,297		Faulkner et al	05/07/2002

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FORM PTO-1449/A and B (Modified)  <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>				APPLICATION NO.: 10/672,821		ATTY. DOCKET NO.: T0529.70004US00	
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				APPLICANT: Muhammad Akbar Khan Afzal			
				GROUP ART UNIT: 2631		EXAMINER: Mohammed H. Ghayour	
Sheet	3	of	4				

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		Number	Kind Code		
		6,389,109		Schmidt et al	05/14/2002
		6,445,733		Zuranski et al	09/03/2002
		6,456,694		Posthuma	09/24/2002
		6,463,126		Manica et al	10/08/2002
		6,466,647		Tennyson	10/15/2002
		6,487,276		Rosen et al	11/26/2002
		6,507,870		Yokell et al	01/14/2003
		6,614,880		Lysaght et al	09/02/2003
		6,687,336		Holeva	02/03/2004
		6,741,676		Rudinsky et al	05/25/2004
		6,781,386		LeHenaff	08/24/2004
		2002/0089999		Binde	07/11/2002
		2003/0048756		Chang et al	03/13/2003

#### FOREIGN PATENT DOCUMENTS

Examiner's Initials	Cite No.	Foreign Patent Document			Name of Patentee or Applicant of Cited Document (not necessary)	Date of Publication of Cited Document MM-DD-YYYY	Translation (Y/N)
		Office/ Country	Number	Kind Code			
		WO	91/11872		Raychem Limited	08/08/1991	
		WO	98/44428	A1	Porta Systems	10/08/1998	
		WO	99/63427	A1	GTE Corp.	12/09/1999	
		WO	00/27134		Teradyne, Inc.	05/11/2000	
		WO	00/64132		Teradyne, Inc.	10/26/2000	
		WO	01/01597	A1	Teradyne, Inc.	01/04/2001	
		WO	01/24490		Teradyne, Inc.	04/05/2001	
		WO	01/67729	A1	Teradyne, Inc.	09/13/2001	
		EP	0722164	A1	AT&T Corp.	17/07/1996	

#### OTHER ART — NON PATENT LITERATURE DOCUMENTS

Examiner's Initials	Cite No	Include name of the author (in CAPITAL LETTERS) title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, relevant page(s), volume-issue number(s), publisher, city and/or country where published.	Translation (Y/N)	
		Backer, et al., "Telephone Access Network Measurements," 1998, Tektronix XP002148949		
		Boets, et al. "The Modelling Aspect of Transmission Line Networks," May 12, 1992, pp. 137-141		
		Chiu et al. "Loop Survey in the Taiwan Area and Feasibility Study for HDSL," IEEE, Vol. 9, No. 6, August 1991, pp. 801-809		
		Eichen, et al., "DSTS: An Expert System for Diagnosis of Advanced Digital Subscriber Services," IEEE Network Operations and Management Symposium, U.S. NY, Vol. Conf. 10, pp. 794-804		
EXAMINER:			DATE CONSIDERED:	

FORM PTO-1449/A and B (Modified)  <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>				APPLICATION NO.: 10/672,821		ATTY. DOCKET NO.: T0529.70004US00	
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Sheet	4	of	4				

**OTHER ART — NON PATENT LITERATURE DOCUMENTS**

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		Goralski, "xDSL Loop Qualification and Testing," IEEE Communications Magazine, May 1999		
		Harris Communications, National Communications forum Presentation, Chicago, IL 10/05/1998		
		Harris White Paper, "Testing in the Unbundled Loop: The Challenge for ILECS and C:ECs". pp. 1-		
		Hedlund, et al., "DSL Loop Test Telephony, Vol. 235, No. 8, 08/24/1998		
		Heikman Product Information Release, "Introducing Hekimian's Comprehensive ADSL Test Solution,"		
		IEEE Std 743-1995 "IEEE Standard Equipment Requirements and Measurement Techniques for Analog Transmission Parameters for Telecommunications" 1996		
		"Loop Qualification, Prerequisite for Volume xDSL Deployment," The TeleChoice Report on xDSL, Vol. 2, No. 3, March 1997		
		"Network and Customer Installation Interfaces -Asymmetric Digital Subscriber Line (ADSL) Metallic Interface," ANSI T10413-1998. Revision of ASSI T1. 413-1995 (Not Published)		
		Stewart, "Testing ADSL: The Easier the Better, America's Network," 12/15/1998 pp. 24-27		
		Turnstone Systems, Inc., Product Literature and Presentation at Turnstone Systems, Inc., September 1992		
		Roehrkasten, "Messung Von SDSL-Parametern", Nachrichtentechnik Elektronik, DE Veb Verlag Technik. Berlin, Vol. 48, No. 2, March 1, 1998, pp. 20-21		
		Rye Senjen et al, "Hybrid Expert Systems for Monitoring and for Diganosis", proceedings of the Conference on Artificial Intelligence for Applications, IEEE, Comp. Soc. Press. Vol, Conf. 9, 3/1/1993, pp. 235-241		
		Woloszynski, "It's Here," Bellcore Exchange Magazine, 6/98		
		Zieman, "ADSL Line Qualification Tests," Online!, Wandel and Goltermann, <a href="http://www.wg.com/appnotes/adsltest.html">http://www.wg.com/appnotes/adsltest.html</a>		
EXAMINER:			DATE CONSIDERED:	

#EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to Applicant.

\*a copy of this reference is not provided as it was previously cited by or submitted to the office in a prior application, Serial No. \_\_, filed \_\_, and relied upon for an earlier filing date under 35 U.S.C. 120 (continuation, continuation-in-part, and divisional applications).

[NOTE - The Office hereby waives the requirement under 37 CFR 1.98 (a)(2)(i) for submitting a copy of each cited U.S. patent and each U.S. patent application publication for all U.S. national patent applications filed after June 30, 2003 and for all international applications that have entered the national stage under 35 USC 371 after June 30, 2003. See 37 CFR 1.491(b). For all patent applications filed on or before June 30, 2003, copies of cited U.S. patents and patent application publications are still required unless an eIDS is filed. Copies of all other patent(s), publication(s), or other information listed must still be provided, even if it was previously submitted to, or cited by, the U.S. Patent Office in an earlier application, unless the earlier application is identified by the IDS and is relied upon for an earlier filing date under 35 U.S.C. §120, and the copy was provided in the earlier application.]